

10/050,394

F0466(AMDP574US)

**REMARKS**

Claims 1-8 are currently pending in the subject application and are presently under consideration. A clean version of all pending claims is found at pages 2-3. Upon allowance of claims 1-8, applicants' representative intends to rejoin non-elected method claims 9-24 via amendment thereto so that such non-elected claims recite structural features of the allowed device/system claims.

Favorable reconsideration of the subject patent application is respectfully requested in view of the comments herein.

**I. Objection of drawings under 37 CFR §1.83(a)**

The drawings are objected to under 37 CFR §1.83(a) for failing to show every feature of the invention specified in the claims. Specifically, the Examiner states that the power supply clamp of claim 5 is not shown in the drawings. Withdrawal of the objection is requested for at least the following reason.

The power supply clamp diode of claim 5 is displayed as the diode numbered 52 in Figure 2. Page 6 lines 19-21 of the specification reads "The power supply clamp device 50 is comprised of a singled diode 52 with its anode connected to the supply  $V_{SS}$  and its cathode connected to the supply  $V_{CC}$ ." The withdrawal of the objection is respectfully requested.

**II. Rejection of Claim 3 Under 35 U.S.C. §112**

Claim 3 stands rejected under 35 U.S.C. §112 as being indefinite for failing to particularly point out and distinctly claiming the subject matter which the applicant regards as the invention. It is respectfully submitted that this rejection should be withdrawn for at least the following reason.

One skilled in the art would understand the term "2V" as meaning "2 Volts." The equation found in claim 3 can also be found on page 6, line 26 of the specification. For at least the above reason, withdrawal of the subject rejection is respectfully requested.

10/050,394

F0466(AMDP574US)

### III. Rejection of Claims 1-4 and 7 Under the Admitted Prior Art

Claims 1-4 and 7 stand rejected under 35 U.S.C. §103(a) as being unpatentable over the admitted prior art. It is respectfully submitted that this rejection should be withdrawn for at least the following reasons.

Rejected claims independent claim 1 is believed to be allowable for at least the following reasons. The admitted prior art does not teach or suggest all elements of the present claimed invention.

In order to establish a prima facie case of obviousness, the teaching or suggestion to make the claim modification *must be found in the cited art*, not based on the applicant's disclosure. *In re Vaeck*, 947 F.2d 488, 20 USPQ2d 1430 (Fed. Cir. 1991). Furthermore, the mere fact that the reference can be modified does not render the modification obvious unless the cited art also suggests the desirability of the modification. *In re Mills*, 916 F.2d 680, 16 USPQ2d 1430 (Fed. Cir. 1990).

The subject claimed invention teaches utilizing at least one protection diode with a reverse break down voltage less than a break down voltage of a gate oxide layer of a CMOS device. Therefore when an undesirable electrostatic discharge occurs, the diode will conduct in the reverse break down region, thus preventing undesirable current from flowing through the CMOS device. Damage to the CMOS device is therefore avoided.

In contrast, the admitted prior art teaches the use of a diode with a reverse break down voltage greater than the break down voltage of the gate oxide layer of a CMOS device. Specifically, the admitted prior art teaches use of diodes with a reverse break down region of 12-13 volts while the break down voltage of the gate oxide layers of the CMOS device are 9-10 volts. Therefore the gate oxide layers of the CMOS device are only protected when the electrostatic discharge voltage reaches 12-13 volts. The higher reverse break down voltage of the diodes is required because the prior art utilizes a BJT in the power supply clamp. If the reverse break down voltage of the diodes were less than 12-13 volts, the BJT would operate inefficiently during an electrostatic discharge which resulted in a positive stress to V<sub>CC</sub>. Increasing the break down voltage of the gate oxide layers of the CMOS device would result in increased production costs. Therefore, the admitted prior art fails to teach or suggest the present invention let alone the admitted prior art teaching away from the subject

10/050,394

F0466(AMDP574US)

invention.

In view of at least the above reasons, it is readily apparent that the subject invention as recited in independent claim 1 and claims 2-4 and 7, which respectfully depend there from is not obvious over AAPA. This rejection should be withdrawn.

To the extent the Examiner is taking Official Notice in the rejection as to various recited aspects of applicants' claimed invention *vis a vis* deficiencies of the prior art, applicants' representative respectfully traverses such Notice and requests the Examiner to provide a reference in support of the Official Notice pursuant to MPEP §2144.03 if the subject rejection is maintained.

**IV. Rejection of Claims 5, 6, and 8 Under 35 U.S.C. §103(a)**

Claims 5, 6, and 8 stand rejected under 35 U.S.C. §103(a) as being unpatentable over the admitted prior art in view of Ito *et al.* (U.S. 5,416,351). It is respectfully submitted that this rejection should be withdrawn for at least the following reasons. Claims 5, 6, and 8, depend from independent claim 1 is therefore moot, and Ito *et al.* does not make up for the aforementioned deficiencies of AAPA with respect to claim 1. Accordingly, withdrawal of the subject rejection is respectfully requested.

10/050,394

F0466(AMD)P574US)

**V. Conclusion**


The present application is believed to be condition for allowance in view of the above comments and amendments. A prompt action to such end is earnestly solicited.

In the event any fees are due in connection with this document, the Commissioner is authorized to charge those fees to Deposit Account No. 50-1063.

Should the Examiner believe a telephone interview would be helpful to expedite favorable prosecution, the Examiner is invited to contact applicant's undersigned representative at the telephone number listed below.

Respectfully submitted,

AMIN &amp; TUROCY, LLP



Himanshu S. Amin

Reg. No. 40,894

AMIN & TUROCY, LLP  
24<sup>TH</sup> Floor, National City Center  
1900 E. 9<sup>TH</sup> Street  
Cleveland, Ohio 44114  
Telephone (216) 696-8730  
Facsimile (216) 696-8731

FAX RECEIVED

APR 24 2003

TECHNOLOGY CENTER 2003